UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
08/990,973	12/15/1997	ELIZABETH A. SMITH	A-4251	1916

5642 7590 02/14/2008

SCIENTIFIC-ATLANTA, INC.
INTELLECTUAL PROPERTY DEPARTMENT
5030 SUGARLOAF PARKWAY
LAWRENCEVILLE, GA 30044

EXAMINER	
SALCE, JASON P	

ART UNIT	PAPER NUMBER
2623	

NOTIFICATION DATE	DELIVERY MODE
02/14/2008	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

PTOmail@sciatl.com

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES

Ex parte ELIZABETH A. SMITH and LEE R. JOHNSON

Appeal 2007-2547
Application 08/990,973
Technology Center 2600

Decided: February 12, 2008

Before MAHSHID D. SAADAT, ROBERT E. NAPPI,
and SCOTT R. BOALICK, *Administrative Patent Judges*.

SAADAT, *Administrative Patent Judge*.

DECISION ON APPEAL

STATEMENT OF THE CASE

Appellants appeal under 35 U.S.C. § 134(a) from the Examiner's Final Rejection of claims 27-54, which are all of the claims pending in this application as claims 1-26 have been canceled. We have jurisdiction under 35 U.S.C. § 6(b).

Appellants' invention relates to a method and system for efficiently controlling the storage of data in the local storage of an interactive terminal system at the user location by choosing and updating data items to be stored according to the relative priority of data entries (Specification 3). Figures 7a and 7b show a fan-out and a serial chain type flow for accessing different screens (Specification 13). Each time a screen is selected, the other screens in unselected branches or locations will not be accessed and can be considered for deletion (*Id.)*.

Independent claim 27 is representative and reads as follows:

> 27. A method for use in an interactive television system, the interactive television system including a system manager coupled to a plurality of subscriber terminals, comprising the steps of:
>
> receiving a first user input at a subscriber terminal indicating a choice for one of a video signal and first operation data, wherein the first operation data includes a plurality of screens;
>
> generating a screen of first operation data responsive to a command, wherein the screen of operation data is generated by a local screen character generator;
>
> saving a screen of the plurality of screens to memory;
>
> determining whether the screen of the plurality of screens saved into memory is directly accessible or accessible only through other screens;
>
> if the screen of the plurality of screens saved into memory is only accessible through other screens, indicating that the screen of the plurality of screens saved into memory is not to be deleted from memory; and

displaying at least one of the video signal and the screen of the first operation data according to the user input, wherein the first operation data is stored in at least one of a screen generator coupled to the system manager and subscriber terminal memory.

The Examiner relies on the following prior art references in rejecting the claims:

Kirschner	US 4,253,157	Feb. 24, 1981
Reiter	US 4,751,578	Jun. 14, 1988
Couch	US 4,752,876	Jun. 21, 1988
Welsh	US 4,829,558	May 9, 1989
Iwashita	US 4,928,168	May 22, 1990
Boulton	US 4,985,697	Jan. 15, 1991

The rejections as presented by the Examiner are as follows:

1. Claims 27-32 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Welsh, Reiter, and Boulton.

2. Claims 33, 39-40, and 43 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Welsh, Kirschner, and Boulton.

3. Claim 46 stands rejected under 35 U.S.C. § 103(a) as being unpatentable over Welsh, Kirschner, Boulton, and Reiter.

4. Claims 34-36, 38, 41, 44-45, and 47-52 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Welsh, Kirschner, Boulton, and Iwashita.

5. Claims 37 and 42 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Welsh, Kirschner, Boulton, and Couch.

6. Claims 53[1] and 54 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Welsh and Boulton.

We make reference to the Briefs (filed Sep. 11, 2006 and Feb. 20, 2007) and the Answer (mailed Dec. 18, 2006) for the respective positions of the Appellants and the Examiner.

We reverse.

ISSUE

The issue on appeal turns on whether substantial evidence before us shows that under 35 U.S.C. § 103, Welsh in combination with Boulton teaches or suggests the claimed subject matter. Specifically, Appellants and the Examiner disagree as to whether the applied prior art discloses or suggests the claimed element of "if the screen of the plurality of screens saved into memory is only accessible through other screens, indicating that the screen of the plurality of screens saved into memory is not to be deleted from memory."

FINDINGS OF FACT

The following findings of fact (FF) are relevant to the issue before us and are believed to be supported by substantial evidence.

---

[1] The phrase "*of the plurality of screens*" in clause "*if the screen saved into memory is only accessible through other screens, indicating that the screen of the plurality of screens saved into memory is not to be deleted from memory*" of claim 53 has no antecedent basis.

1. Welsh relates to a system for remotely displaying screen data on a television at a user's location and for receiving responses from the user. Welsh discloses that storing both screen data and response data enables response data to be transmitted at a later time while screen data can be received and stored for later viewing. (Abstract).

2. Welsh provides for a RAM for storing the questionnaire and the response data during the off-line mode. (Col. 10, ll. 39-47 and l. 65 - col. 11, l. 4).

3. Boulton relates to a method and apparatus for compiling and presenting educational material on an electronic book. One or a few page-equivalent portions for different levels of comprehension or modality are stored in a RAM which may be accessed by a user who can sequentially advance through the stored information. (Col. 2, l. 39 – col. 3, l. 6).

4. Boulton in FIG. 4 describes transferring a number of page-equivalents to a RAM for presentation to the user. The RAM is continually updated so that 10-30 page-equivalents of the subsequent text are available along with 3-10 pages of the text already viewed. A lesser number of pages of additional modalities are stored to maximize the use of RAM. (Col. 7, ll. 4-13).

5. Boulton further discloses that a user can then advance a great distance in the presentation for the material already stored in RAM and can backtrack to some degree while also being able to switch to different modalities. The further a modality is from the current reference, the less

likely a switch will be made as quickly and thus the less need to store as many page equivalents. (Col. 7, ll. 13-20).

PRINCIPLES OF LAW

In rejecting claims under 35 U.S.C. § 103, it is incumbent upon the Examiner to establish a factual basis to support the legal conclusion of obviousness. *See In re Fine*, 837 F.2d 1071, 1073 (Fed. Cir. 1988). In so doing, the Examiner must make the factual determinations set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 17 (1966). "[T]he examiner bears the initial burden, on review of the prior art or on any other ground, of presenting a *prima facie* case of unpatentability." *In re Oetiker*, 977 F.2d 1443, 1445 (Fed. Cir. 1992).

"[I]t can be important to identify a reason that would have prompted a person of ordinary skill in the relevant field to combine the elements in the way the claimed new invention does." *KSR Int'l v. Teleflex Inc.*, 127 S. Ct. 1727, 1741 (2007). "[T]here must be some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness." *In re Kahn*, 441 F.3d 977, 988 (Fed. Cir. 2006) (citing *In re Lee*, 277 F.3d 1338, 1343-46 (Fed. Cir. 2002); *In re Rouffet*, 149 F.3d 1350, 1355-59 (Fed. Cir. 1998)).

Further, a rejection based on section 103 must rest upon a factual basis rather than conjecture, or speculation. "Where the legal conclusion [of obviousness] is not supported by the facts it cannot stand." *In re Warner*, 379 F.2d 1011, 1017 (CCPA 1967). *See also In re Kahn*, 441 F.3d at 988.

ANALYSIS

In rejecting the claims, the Examiner reads substantially all the claimed features, including the limitation of "if the screen of the plurality of screens is saved into memory is only accessible through other screens," on Welsh in combination with the other cited references (Ans. 5). The Examiner further relies on Boulton for teaching that the screen saved into the memory is not to be deleted from the memory if the screen is only accessible through other screens, as recited in all the independent claims (Ans. 6). The Examiner argues that such combination provides the user with rapid access to any one of the modality streams without incurring any delays, as taught by Boulton (*id.*).

Appellants argue patentability of claim 27 based on whether the combination of Welsh and Boulton teaches or suggests the claimed feature of "if the screen of the plurality of screens saved into memory is only accessible through other screens, indicating that the screen of the plurality of screens saved into memory is not to be deleted from memory" (Br. 6-9). Appellants specifically assert that Boulton saves pages based on whether they are positioned close to the present page and argue that deletion of any page is, therefore, based on its distance from the present page and not based on whether the screen is accessible only through other screens (Br. 8).

In pages 20-21 of the Answer, the Examiner appears to have read the first half of the disputed claim limitation on Welsh (col. 10. ll. 39-47 and col. 10, l. 65 – col. 11, l. 4) and the remaining part of the disputed limitation

on Boulton. The Examiner further asserts that Boulton saves the previously viewed screens in the RAM for quick viewing and therefore, provides the saved screens which are not to be deleted from the memory (Ans. 21).

Appellants further argue that while Boulton happens to save some pages that are not directly accessible, direct accessibility is not a factor in deciding whether to indicate that a screen is not to be deleted (Reply Br. 2). Appellants assert that the proximity of the page is the only factor Boulton considers for selecting which range of pages are not to be deleted since the pages that are outside a particular range are not saved regardless of whether the screens are directly accessible or not (*id.*).

After reviewing the disclosure of Welsh and Boulton in light of the arguments of record, we are in general agreement with Appellants' position as stated in the Briefs. While Welsh stores data screens in a RAM for the viewer interaction (FF 1-2), the portions of Welsh cited by the Examiner do not specify how different screens are accessed and whether their access is only through other screens. The only relation Welsh is concerned with is between the information presented to the user and the response entered by the user, which may be stored in a RAM for transmission at a later time (FF 2).

Boulton, on the other hand, receives data related to a range of pages to be viewed by the user (FF 3). The range of pages to be stored is determined based on the position of the page in a sequence of pages such as 10-30 subsequent pages and 3-10 preceding pages with respect to a current page (FF 4-5). As argued by Appellants (Reply Br. 2), even if storing these pages

can be characterized as an indication that a screen is not to be deleted, the selection of a page for storage is based on its proximity or position within the range of the pages. In other words, the range of the pages in Boulton operates as a sliding window along the sequence of pages wherein the pages that fall within the window are stored, whether they are directly accessible or not.

We note that Welsh and Boulton, alone or in combination with other prior art references, are relied on in rejecting the other independent claims 31, 33, 47, 53, and 54, which recite similar limitations related to the accessibility of a stored screen and the indication that it is not to be deleted if it is only accessible through other screens. We have also reviewed the other references applied by the Examiner in rejecting claims 27-52. However, we find nothing in these references which overcomes the deficiencies of the combination of Welsh and Boulton in disclosing the specifically claimed indication that a screen is not to be deleted if it is only accessibly through other screens.

CONCLUSION

Therefore, based on the evidence of record before us, and in view of the above discussion, we are of the opinion that the combination of Welsh and Boulton, even if properly combinable, does not support the obviousness rejections. We, therefore, do not sustain the Examiner's 35 U.S.C. § 103(a)

rejection of claims 27-54 over Welsh and Boulton, alone or in combination with the other applied references.

ORDER

The decision of the Examiner rejecting claims 27-54 under 35 U.S.C. § 103 is reversed.

REVERSED

tdl/gw

SCIENTIFIC-ATLANTA, INC.
INTELLECTUAL PROPERTY DEPARTMENT
5030 SUGARLOAF PARKWAY
LAWRENCEVILLE, GA 30044